

NEW GENUS AND NEW SPECIES OF AMORBINI (HETEROPTERA:
COREIDAE) FROM AUSTRALIA

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Abstract.—*Kormijirania*, n. gen., and two new species, *K. magna* and *K. parva*, collected in Eastern Australia are described in the tribe Amorhini (Coreidae). Habitus illustrations, drawings of the male and female genitalia, and a key are provided.

Key Words: Insecta, Heteroptera, Coreidae, Amorhini, new genus, new species, Eastern Australia

The tribe Amorhini (Hemiptera: Heteroptera: Coreidae) is represented by 7 genera in the Australian region: *Acroelytron* Mayr (1 species), *Amorbus* Dallas (15 species), *Cneius* Stål (1 species), *Gelonus* Stål (1 species), *Kurnaina* Distant (1 species), *Tambourina* Distant (1 species), and a new genus (2 species) (Brailovsky and Monteith, in press).

The present paper adds one new genus and two new species of Amorhini from eastern Australia. For several years, the species discussed here have remained unnamed and undescribed in the hope that additional specimens would be found. However, it seems desirable to draw the attention of entomologists to these species in the hope that additional specimens will be collected and some information obtained on their ecology and food requirements. Two striking features of this new genus are the upturned juga forming a stout long horn or conical tubercle, and the mandibular plate expanded on a remarkable stout conical tubercle.

The following abbreviations are used for the institutions cited in this paper: BPBM (Bernice P. Bishop Museum, Honolulu, Hawaii); SAMA (South Australian Museum,

Adelaide); UNAM (Instituto de Biología, Universidad Nacional Autónoma de México).

All measurements are given in millimeters.

***Kormijirania* Brailovsky and Cassis,
new genus**

Diagnosis.—This new genus resembles *Gelonus* Stål (1865) in having the head wider than long, tylus unarmed and extending anteriorly to the juga, antenniferous tubercles unarmed, tibiae sulcate, not foliate, and abdominal sternite VII of the female with plica and fissura. It is easily distinguished because it is the only known genus in the tribe Amorhini with the upturned juga forming a stout long horn or conical tubercle, and the mandibular plate strikingly expanded on a large conical tubercle.

Kormijirania has a stout antennal segment I, short, and barely crested, antennal segments II and III almost cylindrical, barely flattened, buccula anteriorly with a clear spine-like projection, pronotum slightly wider than long, and fore and middle femora ventrally with small granules or tiny spine-like projections, never with a large and laminate subdistal spine. In *Gelonus* the

juga are flattened, the mandibular plate unarmed, antennal segments I to III uniformly cylindrical, not crested or flattened, buccula anteriorly rounded, pronotum clearly wider than long, and fore and middle femora ventrally provided with a large and unique subdistal laminate spine.

A new genus (Brailovsky and Monteith, in press), is related to *Gelonus* and *Kormijirania* and is recognized by the laterally compressed tylus, which is projected upward as an acute projection, with femora unarmed, juga flat, mandibular plate unarmed, and antennal segments I to III cylindrical.

Description.—Macropterous, body stout, moderate sized. **Head:** Width across eyes greater than length, quadrate, dorsally flat, non declivent, barely produced beyond antenniferous tubercles, with deep circular pit close to base of tylus; tylus unarmed, slightly deflexed; juga shorter than tylus, upturned to form a stout long horn or conical tubercle; antenniferous tubercle unarmed, prominently produced, wide, separated by distance greater than their own width; sides of head in front of eyes almost straight; antennal segment I robust, thickest, barely crested, constricted basally; segments II and III stout, cylindrical, barely flattened; segment IV fusiform; antennal segment II longest, IV shortest, and III longer than I; ocelli conspicuous, closer to eyes, and located on an hypothetical line with lower margin slightly above lower margin of eyes; preocellar pit deep; eyes protruding; postocular tubercle markedly produced; buccula rounded, short, not projecting beyond anterior third of antenniferous tubercles, slightly raised, anteriorly with a sharp spine-like projection, and posteriorly closed; rostrum reaching posterior third of mesosternum or anterior third of metasternum; rostral segment III shortest, I longest, and II longer than IV; mandibular plate expanded on a strong conical tubercle or acute tooth; ventrally with a deep longitudinal groove along midline to

receive first and anterior third of rostral segment II; mandibular plate with markedly stout conical tubercle.

Thorax: Pronotum wider than long, trapeziform, non declivent; collar wide; frontal angles produced forward as rounded teeth; humeral angles rounded, not exposed; anterolateral margins slightly emarginate, obliquely straight, finely serrate; posterolateral margins sinuate, entire; posterior border concave, entire; callar region indistinct, transversely flat, separated along midline by an obscure longitudinal groove; posterior lobe with transverse ridge, distinctly raised; prosternum mesally with a slight depression; mesosternum with deep longitudinal groove to receive rostrum; anterior third of mesosternum without lateral expansions; anterior lobe of metathoracic peritreme elevated, irregularly reniform, posterior lobe sharp, small.

Legs: Short; femora slightly incrassate; fore and middle femora densely granulate, with small spine-like projections both dorsally and ventrally; hind femur slightly granulate, ventrally armed with two short subdistal spines or very tiny tubercles; tibiae terete, sulcate.

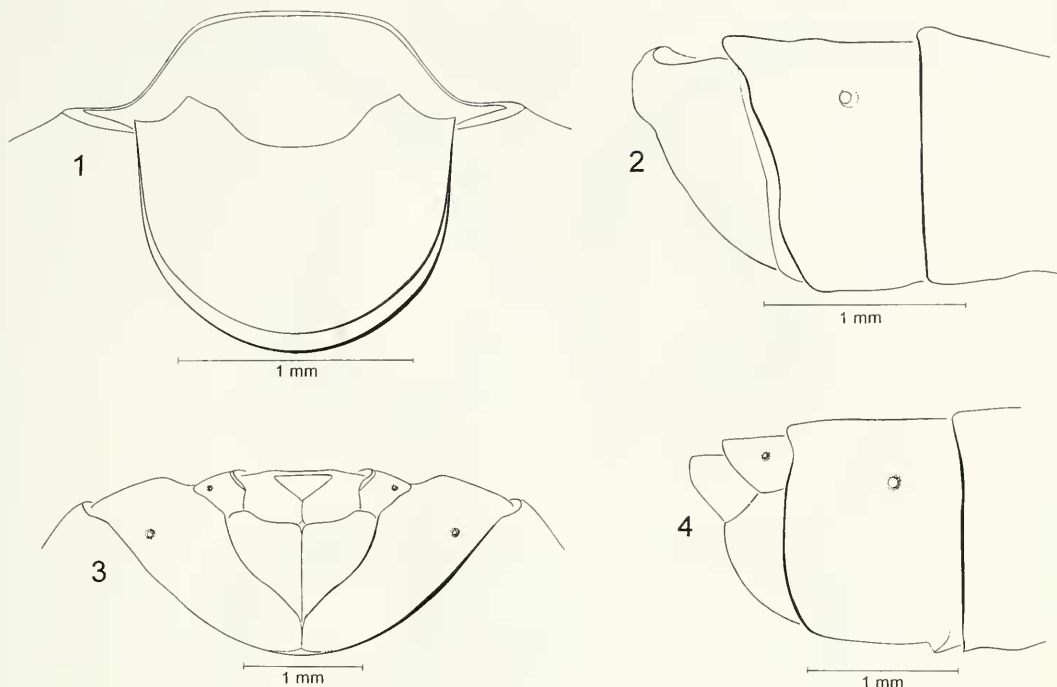
Scutellum: Triangular, longer than wide; apex truncated or subacute; disc flat.

Hemelytra: Macropterous, almost reaching apex of last abdominal segment; costal margin emarginate; apical margin straight; apical angle short, barely reaching middle third of hemelytral membrane.

Abdomen: Connexival segments reflexed above margin of hemelytron at rest; upper margin weakly serrate; posterior angles of connexival segments simple, not spinose; abdominal spiracles II to VII submarginal, closer to middle third.

Male genitalia: Genital capsule: Simple; posteroventral border slightly concave, with posterolateral angles broadly produced (Figs. 1, 2).

Female genitalia: Abdominal sternite VII with plica and fissura; plica triangular, slightly elevated, apically subacute, and reaching anterior third of sternite VII.



Figs. 1-4. 1, 2. Male genital capsule of *Kormijirania parva*. 1. Caudal view. 2. Lateral view. 3, 4. Female genital plates of *K. magna*. 3. Caudal view. 4. Lateral view.

Genital segments: Gonocoxae I enlarged dorso-ventrally, in caudal view closed, in lateral view slightly convex, with upper margin sinuate; paratergite VIII triangular, with spiracle visible; paratergite IX square, larger than paratergite VIII (Figs. 3, 4).

Integument: Body surface rather dull, almost glabrous. Head, antennal segments I to III, pronotum, clavus, corium, legs, connexival segments, propleuron, mesopleuron, metapleuron, and pleural abdominal sterna densely granulate; prosternum, mesosternum, metasternum, abdominal sterna, and genital plates almost smooth; posterior lobe of pronotum, clavus and corium, densely punctate.

Etymology.—We are pleased to name this new genus for Dr. Nicholas A. Kormilev, distinguished hemipterist.

Type species.—*Kormijirania parva* Brailovsky and Cassis, new species.

Kormijirania magna Brailovsky and Cassis, new species

(Figs. 3-5)

Description.—Measurements: *Female*: Head length 1.39; width across eyes 2.04; interocular space 1.30; interocellar space 0.46; preocular distance 1.05; length of antennal segments: I, 1.79; II, 2.13; III and IV mutilated. Pronotum: Total length 2.54, width across frontal angles 1.89; width across humeral angles 2.97. Scutellar length 1.51; width 1.24. Total body length 12.10.

Female: Dorsal coloration: Head, antennal segments I and II (III and IV mutilated), anterior lobe of pronotal disk, clavus and corium dirty yellow with red-brown to chestnut-orange punctures and tubercles; posterior lobe of pronotal disc dirty yellow with black to red-brown punctures; scutellum dark brown to black; apical angle of corium almost black; hemelytral membrane dirty white, with veins, basal angle, and

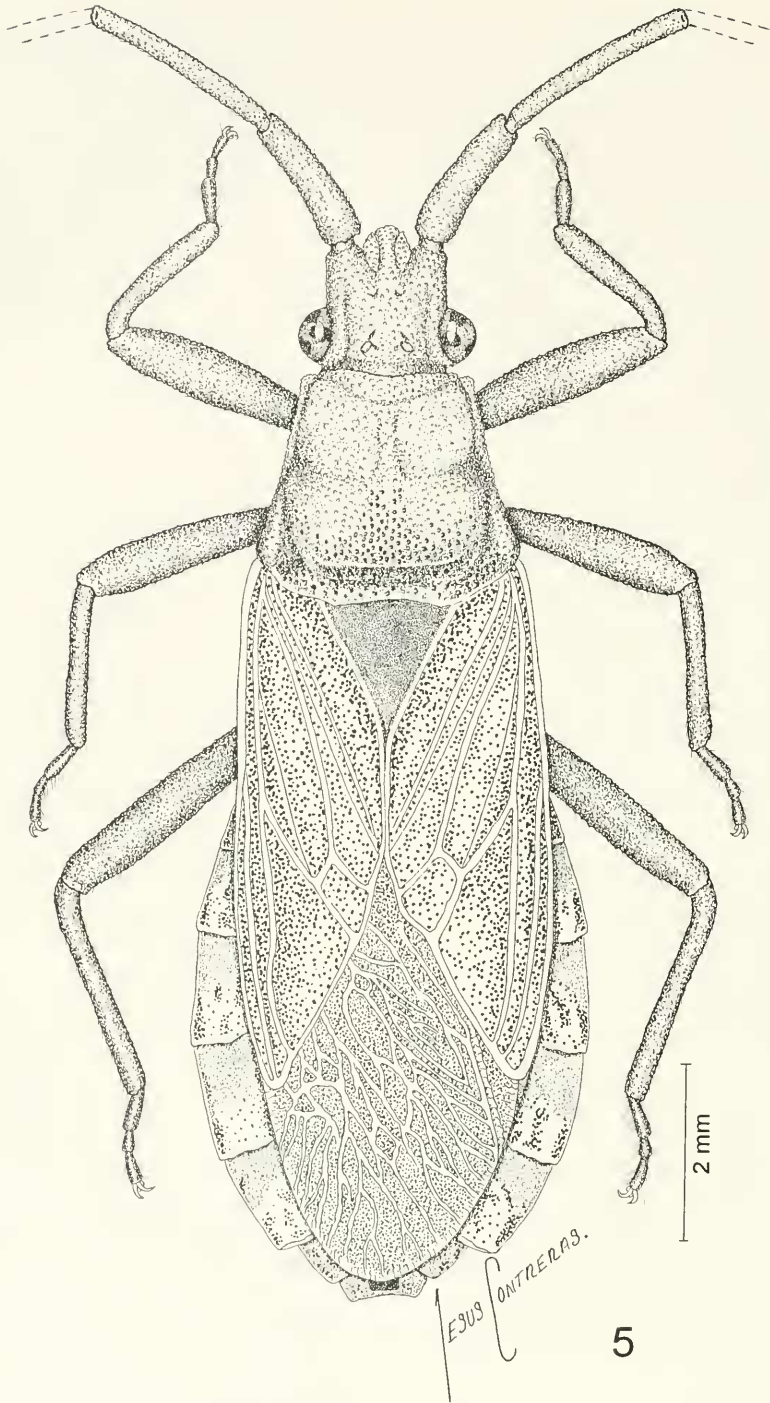


Fig. 5. Dorsal view of *Kormijirania magna* (♀).

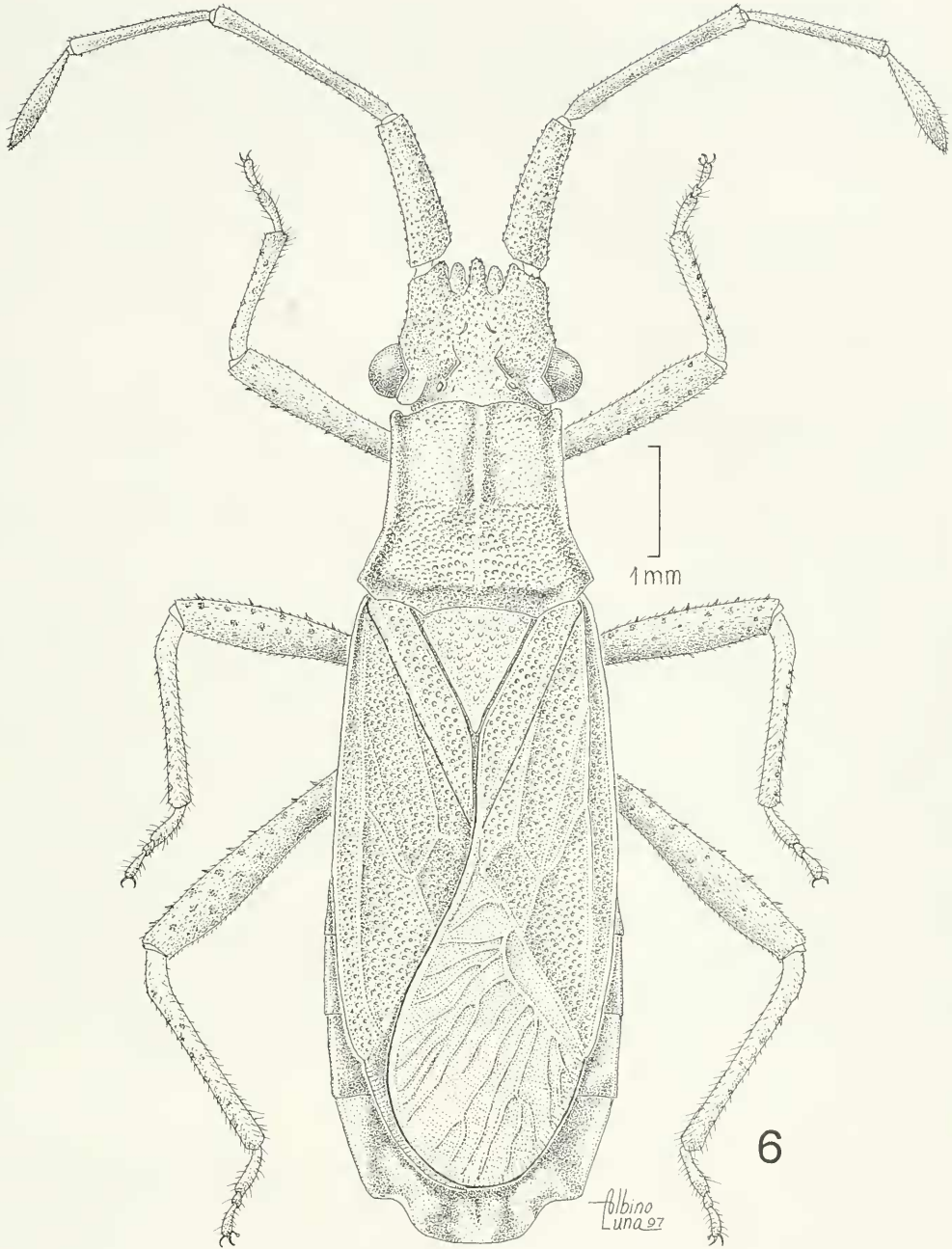


Fig. 6. Dorsal view of *Kormijirania parva* (♂).

scattered spots pale brown; connexival segments III to VIII light orange yellow, with upper margin of posterior third, and tubercles brown; connexival segment IX pale orange yellow, with black quadrate spot on middle third. Ventral coloration: Including

rostral segments I to IV (apex of IV black), and legs dirty yellow with red-brown tubercles; abdominal sterna, and genital plates shiny yellow, with pale orange discoidal spots. *Structure*: Genital plates as in Figs. 3, 4.

Male: Unknown

Type material.—Holotype: ♀, Australia, Queensland, Mackay (without additional data) (BPBM).

Etymology.—Named for its large size; from the Latin word *magnus*.

***Kormijirania parva* Brailovsky and
Cassis, new species**

(Figs. 1, 2, 6)

Description.—Measurements: *Male:* Head length 1.20; width across eyes 1.86; interocular space 1.17; interocellar space 0.43; preocular distance 0.96; length of antennal segments: I, 1.24; II, 1.76; III, 1.39; IV, 1.14. Pronotum: Total length 1.70; width across frontal angles 1.51; width across humeral angles 1.96. Scutellar length 0.98; width 0.80. Total body length 9.00. *Female:* Head length 1.35; width across eyes 1.92; interocular space 1.20; interocellar space 0.43; preocular distance 0.96; length of antennal segments: I, 1.36; II, 1.87; III, 1.54; IV, mutilated. Pronotum: Total length 2.10; width across frontal angles 1.70; width across humeral angles 2.25. Scutellar length 1.24; width 1.02. Total body length 10.00.

Male: Dorsal coloration: Yellow with punctures orange hazel; ocellar tubercle red brown; antennal segments I to III yellow with red brown tubercles; segment IV with anterior half whitish yellow, and posterior half orange hazel; humeral angles red brown; apex of scutellum whitish yellow; hemelytral membrane dirty white, with veins, basal angle, and scattered spots pale brown; connexival segments II to VII yellow with upper margin of posterior third or entirely the posterior third reddish brown; abdominal segments I to VI light orange

yellow and VII yellow with H-shaped dark spot. *Ventral coloration:* Included rostral segments I to IV (apex of IV black), buccula, and anterior and posterior lobe of metathoracic peritreme light yellow with some red-brown tubercles; genital capsule dark brown with three irregular yellow spots; legs yellow with red to pink tubercles. Structure: Genital capsule as in Figs. 1–2.

Female: Similar to male.

Type material.—Holotype: ♂, Australia, Cairns District, Col. A. M. Lea (without additional data) (SAMA). Paratype: 1 ♀, same data as holotype (SAMA). Both specimens glued on the same card.

Etymology.—Named for its small size; from the Latin word *parva*, rather small.

KEY TO SPECIES OF *KORMIJIRANIA*

1. Femora dirty yellow without red to pink tubercles (Fig. 5); antennal segment I longer than 1.70, and II longer than 2.00
 *magna* Brailovsky and Cassis, new species
- Femora yellow with red to pink tubercles (Fig. 6); antennal segment I shorter than 1.40, and II shorter than 1.90
 *parva* Brailovsky and Cassis, new species

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LITERATURE CITED

- Brailovsky, H. and G. B. Monteith. In press. A new genus of Amorhini (Heteroptera: Coreidae) from Australia, with two new species. *Memoirs of the Queensland Museum*.
- Stål, C. 1865. *Hemiptera Africana II*. Stockholm: Nordstedtiana. 200 pp.